05 / RFID INVENTORY CHAMBER

RFID Inventory Chamber

Designed primarily for storage-location inventory: place movable location bins directly on the cart, or first transfer loose goods from fixed locations into storage totes, then push them into the chamber for checking. Receiving can also be organised one box at a time.

Structure and prototype validation in progress



Xinhuotong product illustration · Four-sided enclosure + L-shaped cart

Primarily for storage-location inventory, with box-by-box receiving checks too.

The fixed enclosure comprises a top, two sides and an end panel. The L-shaped cart moves independently with its rear cover and deck. When docked, these two moving panels close the entrance and bottom. Antennas and cables belong to the fixed enclosure; the cart carries the goods.

01

Storage-location inventory: two loading methods

Place movable location bins directly on the cart. Transfer loose goods from fixed locations into storage totes first, retain the location identifiers, and return the goods after counting and review.

02

The L-shaped cart moves independently

The vertical rear cover and horizontal deck move with the cart. Cart and enclosure have independent wheel sets.

03

Also supports receiving one box at a time, checking each box separately.

Retrieve the relevant receiving document or box manifest, read EPCs one box at a time, and check products and quantities. Individual items can be compared when a complete EPC manifest is available. Review discrepancies before confirming receipt through the business workflow; inventory posting remains a separate step, subject to interfaces and permissions.

WORKFLOW & DELIVERY

Workflow and delivery conditions

01

Prepare totes by storage location

Remove a movable location bin directly. Transfer loose goods from a fixed location into a storage tote first, keeping the original location identifier and avoiding mixed contents.

02

Load the tote and push the cart in

Place the tote on the L-shaped cart's deck and push it into the enclosure, checking load, guidance and clearance.

03

Dock, close and capture

The rear cover closes the entrance and the deck closes the bottom. Read full EPCs using the validated workflow, linking them to the current storage location and batch.

04

Review and return goods to their original location

Withdraw the cart and review item details and discrepancies. Return movable bins whole, and return goods from fixed locations according to their original identifiers to prevent misplacement.

Workflow outputs Batch tag details / Item quantity summary / Unknown tags and review records

Structural components	A four-sided fixed enclosure plus an L-shaped cart with a rear cover and deck.
Reading components	Antennas face into the chamber. Readers, wiring and capture rules are subject to prototype validation.
Goods to confirm	Tag type, arrangement, packaging, maximum load and nearby tag environment.
10.1-inch Pad with quick-release magnetic mounting	A quick-mount magnetic base on the chamber roof holds a detachable 10.1-inch Pad and supports rotation and forward/backward tilt adjustment. The Pad's approximately 110×110mm rear magnetic mount also fits the Packing Station, Inventory Robot and Returns Inspection Station. Type-C connects to each device's dedicated interface to control RFID reading/writing, printing and other functions, reducing purchasing and application maintenance costs.
Delivery approach	Validate the first assembly and tag reading before confirming structure, configuration and supply scope.

Current capabilities and validation scope

A closed structure does not itself establish RF isolation performance. Missed reads inside, cross-reads outside, seams, wheels and loaded operation require physical testing. Unverified read rates and accuracy figures are not published.

Discuss your goods-handling workflow

WeChat contact: Only1 · Email: contact@only1code.com

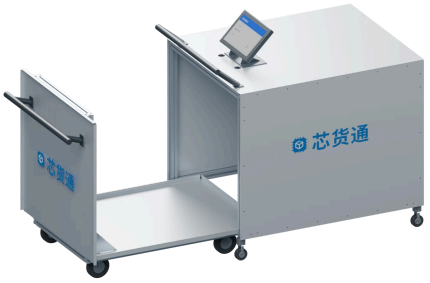
https://solutions.only1code.com

Hardware, software, interfaces and services are confirmed against the actual configuration.

TWO STORAGE METHODS · ONE WORKFLOW

Two storage methods. One tote-based inventory workflow.





Storage tote + L-shaped cart + RFID Inventory Chamber illustration · Xinhuotong branding retained

01

Movable location bin: take the whole bin straight onto the cart

If a shelf location bin is made from a storage tote and can be moved whole, there is no need to empty its goods first. Take it down with its location identifier, place it on the L-shaped cart and push it into the chamber for verification.

Take the location bin off the shelf → Place the whole tote on the L-shaped cart → Push in for inventory counting → Review and return the whole bin

02

Loose goods in fixed locations: transfer to a tote, then load the cart

If loose goods are stored in a fixed location that cannot be moved, transfer them into a storage tote and retain their original location identifier. Place the tote on the L-shaped cart and push it into the chamber. After checking, return the goods to their original location.

Transfer fixed-location goods into a tote → Identify the original location and load the cart → Push in for inventory counting → Check and return goods to their marked location

Keep each storage location linked to the items in its tote throughout the operation. Do not mix locations when transferring goods. Tote dimensions, loaded height and weight, tags and packaging materials require prior validation. Expected tags not read and tags read outside the chamber both require review.

Discuss your goods-handling workflow

WeChat contact: Only1 · Email: contact@only1code.com

https://solutions.only1code.com

Hardware, software, interfaces and services are confirmed against the actual configuration.